



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/069,603

02/28/2002

Kyoko Kobayashi

0992-0128P

3606

2292 7590 10/16/2007
BIRCH STEWART KOLASCH & BIRCH
PO BOX 747
FALLS CHURCH, VA 22040-0747

EXAMINER

VO, HAI

ART UNIT

PAPER NUMBER

1794

NOTIFICATION DATE

DELIVERY MODE

10/16/2007

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

mailroom@bskb.com

Office Action Summary	Application No. 10/069,603	Applicant(s) KOBAYASHI ET AL.	
	Examiner Hai Vo	Art Unit 1794	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 07 August 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 4-13, 15-40 and 52-58 is/are pending in the application.
- 4a) Of the above claim(s) 53-57 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 4-13, 15-40, 52 and 58 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

1. All of the art rejections are sustained. Additionally, new ground of rejection is made in view of newly cited reference to EP 1 095 764.

Election/Restrictions

2. Newly submitted claims 53-57 are directed to an invention that is independent or distinct from the invention originally claimed for the following reasons:

Restriction is required under 35 U.S.C. 121 and 372.

This application contains the following inventions or groups of inventions which are not so linked as to form a single general inventive concept under PCT Rule 13.1.

In accordance with 37 CFR 1.499, applicant is required, in reply to this action, to elect a single invention to which the claims must be restricted.

Group I, claim(s) 4-13, 15-40, 52 and 58 drawn to a foamed laminate.

Group II, claim(s) drawn to 53-57 drawn to a process for producing a foamed laminate.

The inventions listed as Groups I-II do not relate to a single general inventive concept under PCT Rule 13.1 because, under PCT Rule 13.2, they lack the same or corresponding special technical features for the following reasons: claim 4 is obvious over EP 974 617 in view of EP 976 782 (see rejections below). As the recited structure does not make a contribution over the prior art, unity of invention is lacking and restriction is appropriate.

Since applicant has received an action on the merits for the originally presented invention, this invention has been constructively elected by original presentation for prosecution on the merits. Accordingly, claims 53-57 are withdrawn

from consideration as being directed to a non-elected invention. See 37 CFR 1.142(b) and MPEP § 821.03.

3. Applicants are reminded of their right to request rejoinder of method claims with the product claims upon indication of the product claims as being allowable. The method claims must be commensurate with the allowed article claims, i.e. have been amended to recite all the features of the allowed article claims. See *In re Ochiai* 37 USPQ2d 1127.

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 4-13, 15-40, 52 and 58 are rejected under 35 U.S.C. 103(a) as being unpatentable over EP 974 617 in view of EP 976 782. Yorita et al (US 6,303,666) ("Yorita") is relied on as an equivalent form of EP 976 782. EP'617 teaches a laminate for use in glass run channels comprising a core and a skin member being bonded to the core. EP'617 teaches the skin member made of an ultrahigh molecular weight polyolefin having an intrinsic viscosity within the claimed range [0103]. EP'617 also teaches the skin member comprising an olefin thermoplastic elastomer and at least one kind of lubricant recited by the claims (abstract). EP'617 also teaches the olefin thermoplastic elastomer used in the skin layer comprising a mixture of the crystalline polyolefin resin and the rubber to a dynamic heat treatment

[0071] in the presence of a cross-linking agent (abstract). EP'617 teaches the core being an olefin thermoplastic elastomer. EP'617 is silent as to the core being a foamed body of the olefin thermoplastic elastomer. Yorita, however, teaches a production of expanded olefinic thermoplastic elastomer for use in weather strip sponges (column 27, line 49). Yorita teaches the weather strip sponge comprising a foamed body made of a thermoplastic elastomer (A-3) and the olefinic plastic (B) in proportions of from 50-99 parts by weight and 1 to 50 parts by weight respectively (column 13, lines 5-15) wherein the thermoplastic elastomer (A-3) comprises a crosslinked olefin copolymer (a) and a decomposable olefin plastic (b) (column 8, lines 20-25).

Yorita (US'666)***Claimed invention***

Crosslinked olefinic copolymer (A-3)(a)

ethylene/ α -olefin copolymer (a-2)

Olefinic plastic (B)

polyethylene resin (a-1)

Yorita discloses the cross-linked olefinic copolymer (A-3)(a) and a decomposable olefinic plastic resin (A-3)(b) are subjected to dynamic crosslinking in the presence of a crosslinking agent. Yorita teaches the olefinic plastic (B) is added to the admixture ((A-3)(a) and (A-3)(b)) **after** the cross-linked olefinic copolymer (A-3)(a) is already prepared so as to eliminate the thermal decomposition and crosslinking of olefinic copolymer A-3)(a) by heat, thereby obtaining an expanded product as intended (column 13, lines 25-35). Since the olefinic copolymer (A-3)(a) is already crosslinked before kneaded under heat with the olefinic plastic (B), no cross-linking agents are required when the admixture of the olefinic plastic (B) and

the crosslinked olefinic copolymer (A-3)(a) are subjected to the dynamic heat treatment. The recitation "the ethylenic thermoplastic elastomer (A) has no crosslinking prior to dynamic heat treatment" does not necessarily indicate that none of the components (a-1) and (a-2) would be cross-linked, but rather the crosslinking between the components is not activated because of the absence of a crosslinking agent. To the examiner's interpretation, the recitation does not exclude an embodiment wherein the ethylenic thermoplastic elastomer (A) could have one crosslinked component and the crosslinking between the crosslinked component and other components is not activated due to the absence of a cross-linking agent. Yorita teaches the weather strip sponge comprising a foamed body made of a thermoplastic elastomer (A) and the olefinic plastic (B) in proportions of from 50-99 parts by weight and 1 to 50 parts by weight respectively (column 13, lines 5-15) wherein the thermoplastic elastomer (A) comprises a crosslinked olefin copolymer (a) and a decomposable olefin plastic (b) (column 8, lines 20-25). Yorita teaches the crosslinked olefin copolymer (a) having the composition and a Mooney viscosity as required by the claims (column 7, lines 60-65; column 8, lines 10-15). Yorita teaches the olefinic plastic (B) being a homogeneous polyethylene resin or homogeneous polypropylene resin (column 12, lines 37-45). Yorita teaches the expanded olefinic thermoplastic elastomer product comprising 2 parts by weight of the foaming agent (table 3). Table 1 of Yorita shows that the expanded olefinic thermoplastic elastomer product having the foaming expansion ratio of 2 times. Yorita teaches the a decomposable olefin plastic (b) comprising a polypropylene

resin or a polypropylene/alpha-olefin copolymer in an amount of 5 to 40 parts by weight based on 100 parts by weight of the crosslinked thermoplastic elastomer (a) and the decomposable olefin plastic (b) (column 8, lines 20-25, 43 and 59).

Likewise, the polypropylene resin (b) is present in an amount of 2.5 to 20 parts by weight based on 100 parts by weight of the olefinic thermoplastic elastomer (a combination of (a), (b) and (B)). This reads on Applicant's polypropylene resin (a-3) in an amount of 30 parts by weight or less per 100 parts by weight of total sum of the polyethylene resin (a-1) and the copolymer based on ethylene/alpha-olefin (a-2).

Similarly, this reads on Applicant's olefinic thermoplastic resin (K) in an amount of 1-20 parts by weight or less per 100 parts by weight of the olefinic thermoplastic elastomer (J). It appears that Yorita uses the olefin thermoplastic elastomer having the composition with the amount of each individual component similar to that of the present invention. Therefore, it is the examiner's position that the compression set and melt flow rate of the olefinic thermoplastic elastomer of the expanded product would be inherently present. This is in line with *In re Spada*, 15 USPQ 2d 1655 (1990) which holds that products of identical chemical composition can not have mutually exclusive properties. Yorita teaches the expanded olefinic thermoplastic elastomer products excellent in flexibility, heat resistance, which is important to expectation of successfully practicing the invention of EP'617, thus further suggesting the modification. Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to replace the core of EP'617 with the expanded olefinic thermoplastic elastomer product as taught by

Yorita motivated by the desire to provide the glass run channel excellent in flexibility, and heat resistance.

Yorita teaches the expanded olefinic thermoplastic elastomer comprising 5 to 80 parts by weight of a softening agent per 100 parts by weight of the sum of crosslinked olefin copolymer (a) and the decomposable olefin plastic (b) to make it possible to sufficiently improve the flowability of the thermoplastic elastomer without reducing the heat resistance and tensile characteristics of an expanded product (column 9, lines 60-63). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to employ the softening agent in the foam core motivated by the desire to provide improved flowability of the thermoplastic elastomer without reducing the heat resistance and tensile characteristics of the core.

EP' 617 does not teach how the substrate layer laminated to the skin layer. However, it is a product-by-process limitation not as yet shown to produce a patentably distinct article. It is the examiner's position that the article of EP'617 and Yorita is identical to or only slightly different than the claimed article prepared by the method of the claim, because both articles are formed from the same materials, having structural similarity. Even though product-by-process claims are limited by and defined by the process, determination of patentability is based on the product itself. The patentability of a product does not depend on its method of production. If the product in the product-by-process claim is the same as or an obvious from a product of the prior art, the claim is unpatentable even though the prior product was

made by a different process. *In re Thorpe*, 227 USPQ 964, 966 (Fed. Cir. 1985). The burden has been shifted to the applicant to show unobvious differences between the claimed product and the prior art product. *In re Marosi*, 218 USPQ 289,291 (Fed. Cir. 1983). It is noted that if the applicant intends to rely on Examples in the specification or in a submitted Declaration to show non-obviousness, the applicant should clearly state how the Examples of the present invention are commensurate in scope with the claims and how the Comparative Examples are commensurate in scope with EP'617 as modified by Yorita.

6. The art rejections have been maintained for the same reasons set forth in the Office Action 01/20/2006 and the Advisory Action of 08/02/2006. Additionally, Applicants argue that the muddy friction test is related to improved friction resistance, which would be unexpected to the skilled artisan. The examiner respectfully disagrees. Differences in wear resistance and flexibility are based on assessment rank (1 to 5) and it is generally known that the assessment rank clearly does not provide a standard for ascertaining the requisite degree. Thus, the examiner would not be reasonably apprised of the scope of the muddy friction test. What may be considered to one skilled in the art as "no wear found" may be considered by another skilled in the sliding element art as "partially wear" and vice versa. Accordingly, the showing in the declaration is not considered as unexpected results and thus ineffective to overcome the finding of obviousness.
7. Claims 4-13, 15-40, 52 and 58 are rejected under 35 U.S.C. 103(a) as being unpatentable over EP 1 095 764 in view of EP 976 782. Kobayashi et al (US

Art Unit: 1794

6,589,664) and Yorita et al (US 6,303,666) are relied on as an equivalent form of EP 1 095 764 and EP 976 782 respectively. Kobayashi teaches a laminate for use in gaskets comprising a core and a skin being bonded to the core. Kobayashi teaches the core and the skin made from the compositions set forth in the claims (abstract). Kobayashi is silent as to the core being a foamed body of the olefin thermoplastic elastomer. Yorita, however, teaches a production of expanded olefinic thermoplastic elastomer for use in gaskets (column 27, line 49). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to foam the core of Kobayashi motivated by the desire to provide the gasket having good external appearance, flexibility and heat resistance.

Applicant cannot rely upon the foreign priority papers to overcome this rejection because a translation of said papers has not been made of record in accordance with 37 CFR 1.55. See MPEP § 201.15.

Double Patenting

8. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the “right to exclude” granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent

Art Unit: 1794

either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

9. Claims 4-13, 15-40, 52 and 58 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-13 of U.S. Patent No. 6,589,664 in view of Yorita et al (US 6,303,666). See obviousness rational in paragraph no. 8 above.

Interview Summary

10. On October 9, 2007, the examiner called Applicant's representative to request an examiner's amendment to place the instant claims in condition for allowance. The examiner suggested that the limitation "uncrosslinked ethylenic thermoplastic elastomer" would be overcome the art rejection over EP'617 in view of Yorita and sufficient to place the claimed invention in condition for allowance. The examiner further added the statement that the common ownership was "at the time the invention was made" is necessary to disqualify Kobayashi et al (US 6,589,664) as prior art under 35 U.S.C. 103(c). However, during the telephone conversation, Applicant's representative pointed out that EP 1095764 was an equivalent form of Kobayashi et al (US 6,589,664). Since EP 1095764 is the 102(a) date prior art, the statement of the common ownership will not be sufficient to exclude Kobayashi et al as prior art under 35 U.S.C. 103(c). Applicant's representative suggested a certified translation of the foreign priority paper instead would be needed to overcome

Kobayashi et al. Note that Kobayashi et al is a newly discovered reference and has not been relied as prior art in previous Office Action.

The proposed Examiner's Amendment was actually improper and the examiner respectfully wishes to apologize for any confusion and inconvenience that may have caused. Yorita discloses a foamed body comprising a crosslinked ethylenic thermoplastic (A-3) and an olefinic plastic (B). Note that the copolymer (a-2) of Yorita corresponds to Applicant's ethylenic thermoplastic (A-3). The limitations that the copolymer (a-2) as claimed is uncrosslinked instead would overcome the art rejections over EP'617 in view of Yorita. Unfortunately, that negative limitation is not fully supported by the specification of the present invention. The examiner notes that the decomposed olefin plastic (b) is a required component of the crosslinked thermoplastic elastomer (A-3). Incorporation of "the foamed body consisting of an ethylenic thermoplastic elastomer (A) and a blowing agent wherein the ethylenic thermoplastic elastomer (A) consists of 5 - 60 parts by weight of a polyethylene resin (a-1) and 40 - 95 parts by weight of a copolymer based on ethylene/ α -olefin (a-2), with said constituents (a-1) and (a-2) summing up to 100 parts by weight" into the claim would be sufficient to exclude Yorita as prior art.

Conclusion

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hai Vo whose telephone number is (571) 272-1485. The examiner can normally be reached on Monday through Thursday, from 9:00 to 6:00.

Art Unit: 1794

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rena Dye can be reached on (571) 272-3186. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

HV

/Hai Vo/
Primary Examiner, Art Unit 1794